

**Violent behaviours in drug addiction: Differential profile of drug-addicted patients
with and without violence problems**

Running head: Violence and addictions

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ABSTRACT

This study explored the prevalence of violent behaviours in patients who are addicted to drugs. A sample of 252 addicted patients (203 male and 49 female) who sought outpatient treatment was assessed. Information on violent behaviours, socio-demographic factors, consumption factors (assessed by the *EuropAsi*), psychopathological factors (assessed by *SCL-90-R*) and personality variables (assessed by *MCMI-II*) was collected. Drug-addicted patients who were associated with violent behaviours were compared on all variables to patients who were not associated with violent behaviours. The rate of drug-addicted patients with violent behaviours in this sample was 39.68% (n=100). There were significant differences between the numbers of patients who did and did not demonstrate violence on some variables. Patients with violence problems were younger than those without violence problems and were more likely to report having been a victim of abuse. Moreover, they were significantly more likely to have experienced an overdose and showed a significantly higher score on several *EuropAsi*, *SCL-90-R* and *MCMI-II* variables. According to these results, patients with violence control problems present with both a more severe addiction and several comorbid problems. The implications of these results for further research and clinical practice are discussed.

Keywords: drug addiction; violent behaviour; assessment; comorbidity.

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1. INTRODUCTION

Concern about the relationship between drug abuse and the development of violent behaviour and criminal acts has increased in recent years. Some authors posit that violence is a major cause of morbidity and mortality among drug-addicted patients, especially in patients who are addicted to illegal substances (Marshall, Fairbairn, Li, Wood, & Kerr, 2008). Several studies have shown evidence regarding high rates of physical violence among addicted patients (Clements & Schumacher, 2010; Fernández-Montalvo, López-Goñi, & Arteaga, in press; Moore et al., 2008). These studies have analyzed the violence both from a general perspective and from the specific perspective of gender violence.

Regarding gender-based violence, research has consistently shown evidence of a high presence of alcohol and/or drug abuse among men who batter (Murphy & Ting, 2010). For example, research has shown that approximately 48% of perpetrators of gender violence have problems with alcohol abuse or dependence, and almost 20% demonstrate problems with drug consumption (Fernández-Montalvo & Echeburúa, 1997, 2005). The same relationship is observed when analyzing the problem from the opposite perspective. Recent studies show that between 40-60% of drug-dependent patients who live with their partners have been perpetrators of violence against their partners during the year before beginning treatment for addiction (Easton, Swan, & Sinha, 2000; Fals-Stewart, Golden, & Schumacher, 2003; O'Farrell & Murphy, 1995). This had led to increasing concern about the relationship between intimate partner violence and drug abuse in recent years (Moore, et al., 2008).

Substance abuse also appears to be related to violent behaviour against society and to the commission of criminal acts. In a study by Colasanti, Natoli, Moliterno,

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Rossattini, De Gaspari and Mauri (2008), which evaluated a sample of 350 psychiatric patients, 45% of patients reported aggressive behaviour and 33% of patients demonstrated violent behaviour. In addition, violent behaviours were associated with alcohol and drug abuse. Similar data have been obtained in other studies. In a sample of 1,114 drug users, Mashall and colleagues (2008) found that 70% of women and 66% of men reported some form of aggression in a 5-year follow-up period. Similarly, Mericle and Havassy (2008) found that 41% of the sample studied had been involved in violent behaviours during the month prior to the study. Moreover, drug abuse was a factor in 40% of the detected incidents.

A similar pattern has been shown for the relationship between the commission of criminal acts and drug consumption. Both international studies (Bennett & Holloway, 2005) and those carried out in Spain (Santamaría & Chait, 2004) show a relationship between drug use and numerous criminal acts.

Due to the findings described above, researchers have begun to believe that drug treatment programmes may be an appropriate context to identify the presence of general violent behaviours and partner-specific violence. Identifying behaviours and studying their impact on therapy progress will help clinicians treat both problems simultaneously and thus could help improve the results of existing treatment programmes.

The link between drug abuse, alcohol abuse and violence remains unknown today. Although there is some evidence about the influence of certain drugs in the development of violence behaviours (Marshall, et al., 2008; Martin & Bryant, 2001), the connection between substance use and violent behaviour is complex and is suggestive rather than conclusive (Boles & Miotto, 2003; Fagan, 1993). Moreover, most data have been obtained from alcohol abuse, and there is little research with other drugs. There is

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insufficient research towards the specific causal role that substances play in the perpetration of violence.

One of the most commonly used frameworks developed to explain the relationship between drugs, alcohol and violence was proposed by Goldstein (Goldstein, 1985, 1989). According to this framework, three categories are used to describe the factors that link drugs and violence: a) pharmacological (pharmacological effects of substances enhance violent behaviour, and individuals under the influence of drugs are less aware of their surroundings, making them vulnerable to violence); b) economical (engagement in economically oriented violent crime to sustain drug use behaviours); and c) systemic (the endemic nature of violent interactions within the system of drug distribution and use). However, only limited empirical evidence supports all three components of this conceptual model (Boles & Miotto, 2003; Marshall, et al., 2008; Martin & Bryant, 2001). Increased evidence regarding the relationship between violence and substance abuse underscores the fact that more research is needed to address the nexus between substance abuse and violence and to understand the psychological profile of substance abusers with violence problems.

The present study examined the prevalence rate of violent behaviours in a sample of drug-addicted patients. The main purposes of this study were to assess the specific characteristics of drug-addicted patients with associated violence problems, to identify the differential profiles of patients who do and do not demonstrate violence problems, and to determine the relationship between violence problems and treatment retention and dropout.

2. METHOD

2.1. Participants

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The initial sample consisted of 314 consecutive addicted patients who sought outpatient treatment at the *Proyecto Hombre* Addiction Treatment Programme in Pamplona, Spain from October 2008 to July 2010.

The current study's admission criteria were that the patients had to a) meet the diagnostic criteria of substance dependence according to the *DSM-IV-TR* (American Psychiatric Association, 2000); b) be between 18 and 65 years old; c) give their informed consent to participate in the study; and d) complete the three assessment sessions.

62 (19.8%) of the 314 initial subjects did not meet the criteria mentioned above. Therefore, the final sample was composed by 252 subjects.

The mean age of the individuals included in the study was 37.6 years ($SD=9.5$); the sample included 203 (80.6%) men and 49 (19.4%) women. The socioeconomic level was middle to lower-middle class. The main substances that motivated treatment were cocaine (49.6% of the sample) and alcohol (43.3% of the sample), followed by other substances (e.g., heroin, cannabis, amphetamine, etc.) in smaller numbers (7.1% of the sample).

2.2. Assessment measures

The *EuropAsi* (Kokkevi & Hartgers, 1995) is the European version of the *Addiction Severity Index (ASI)* (McLellan, Luborsky, Woody, & O'Brien, 1980). This interview assesses the need for treatment in the following six areas: a) general medical state; b) labour and economic situation; c) drug consumption (alcohol included); d) legal problems; e) family and social relationships; and f) psychiatric state. In this study we have used the "Composite scores" (CS) of the EuropASI. The composite scores were developed for research purposes; they are arithmetically-based indicators of current (last 30 days) problem severity and range between 0.00–1.00, with higher values

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denoting higher degrees of severity. The composite scores have been calculated according to the proposal by Koeter & Hartgers (1997). The Spanish version of the *EuropAsi* was used in this study (Bobes, González, Sáiz, & Bousoño, 1996).

The *Symptom Checklist-90-Revised (SCL-90-R)* (Derogatis, 1992) (Spanish version by González de Rivera, 2002) is a self-administered general psychopathological assessment questionnaire. It consists of 90 questions that are answered on a 5-point Likert-type scale, ranging from 0 (*none*) to 4 (*very much*). The questionnaire aims to assess the respondent's psychiatric symptoms. The *SCL-90-R* has been shown to be sensitive to therapeutic change, and thus may be used for either single or repeated assessments. The *SCL-90-R* measures nine areas of primary symptoms: somatisation, obsessive-compulsive, interpersonal sensitivity, depression, anxiety, hostility, phobic anxiety, paranoid ideation and psychoticism. It also provides three indices that reflect the subject's overall level of severity.

The *Millon Clinical Multiaxial Inventory (MCMI-II)* (Millon, 1997) is a self-report questionnaire with 175 true/false items. It was designed to identify clinical states and personality disorders that are similar to those contained in the *DSM-IV-TR*. The *MCMI-II* contains eight basic personality scales: 1) Schizoid-asocial; 2) Avoidant; 3) Dependent-submissive; 4) Histrionic-gregarious; 5) Narcissistic; 6) Antisocial-aggressive; 7) Compulsive-conforming; and 8) Passive-aggressive. In addition to the basic personality patterns, there are three pathological personality scales: Schizotypal (S), Borderline (B) and Paranoid (P). The nine symptom scales of the *MCMI-II* were not taken into account in this study as they are not relevant to the purposes of our research. According to the conservative criteria of Weltzer (1990) regarding the *MCMI-II*, a base

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rate score above 84 for the personality scales is considered to be significant for the existence of a personality disorder.

2.3. Procedure

Once the clinical sample was selected using the previously described criteria, the assessment of the sample was carried out in three sessions before beginning the treatment. Each session took place once a week for three weeks; the time interval between sessions was the same for each participant. In the first session, data related to socio-demographic characteristics and drug consumption were collected using the *EuropAsi*. In the second session, the presence of psychopathological symptoms was assessed using the *SCL-90-R*. Finally, in the third session, the prevalence of personality disorders was assessed using the *MCMI-II*.

After the assessment sessions, patients began the standard treatment of *Proyecto Hombre* for addiction. Outpatient treatment at this programme consists of a cognitive-behavioural intervention aimed at abstinence from substances. The treatment lasts an average of 9 months with a subsequent follow-up period of 12 months.

2.4. Data analysis

Descriptive analyses were conducted for all variables. Bivariate analyses were employed using χ^2 or t-test statistics, depending on the nature of the variables studied. A difference of $p < .05$ was considered significant. Statistical analyses were carried out using SPSS (version 15.0 for Windows).

3. RESULTS

3.1. Prevalence of drug-addicted patients with violent behaviours

The rate of drug-addicted patients with violent behaviours in this sample was 39.68% ($n = 100$). Each of these patients reported that they could not control violent

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impulses in different settings whether with family, friends or drug abuse partners. Moreover, in some cases, violence emerged in crime settings to obtain money for buying drugs (e.g., pick-pocketing, shoplifting, robbery, drug dealing, etc.).

3.2. Comparison between drug-addicted patients with and without violent behaviours

3.2.1. *Socio-demographic and consumption variables*

Regarding the socio-demographic variables that were assessed, the only statistically significant difference was found for age. On average, patients associated with violence problems were younger than those without violence problems (Table 1).

PLACE TABLE 1 HERE

The addicted patients with violence problems were also more likely to have experienced an overdose. Overall, 11.5% of the sample had ever experienced a drug overdose. However, addicted patients with violence problems experienced an overdose significantly more frequently (20% of the sample) than those without violence problems (5.9% of the sample).

Regarding areas of the *EuropAsi*, patients with violent behaviours had significantly higher scores on variables related to legal situation, social relationships and need for psychiatric treatment (Table 2). The mean composite scores in these areas show a great need for treatment to resolve the patients' problems.

PLACE TABLE 2 HERE

3.2.2. *Psychopathological variables*

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Regarding psychopathological variables, the results of the *SCL-90-R* symptoms inventory show that only a moderate level of psychopathological symptoms in the subjects studied (Table 2). In fact overall, their score is positive in 37 of the 90 items contained in the inventory (*Positive Symptom Total* = 37.4). Furthermore, according to the *Global Symptoms Index (GSI)* ($X = 31.9$), symptoms do not appear in this sample with any great degree of intensity, as the cut-off point is not exceeded for any of the overall indices or any of the specific dimensions.

In terms of differentiating between the two subgroups in the areas assessed by the *SCL-90-R*, significant differences were found in two overall inventory indices (*GSI* and *PST*), as well as in the obsessive-compulsive, depression, hostility and psychoticism dimensions. Although neither of the subgroups exceeded the cut-off point for these dimensions, the patients with violence problems present with significantly more symptoms than those without violence problems.

3.2.3. *Personality variables*

Drug-addicted patients who were associated with violence problems showed a higher score in four scales of the *MCMI-II*; the scales were the antisocial, aggressive-sadistic, passive-aggressive and borderline scales. Patients who were not associated with violence problems scored significantly higher on the *MCMI-II* dependence personality disorder scale (Table 2).

The overall prevalence rate in this sample for at least one personality disorder was 46.8% ($n=118$) (Table 3). The most prevalent disorders were *Dependence personality disorder* and *Passive-Aggressive personality disorder*, which affected 11.5% and 11.1% of the sample, respectively.

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PLACE TABLE 3 HERE

No statistically significant differences were found between groups regarding the overall prevalence rate of personality disorders. The most prevalent personality disorder among the patients associated with violence problems was passive-aggressive personality disorder (20%), followed by antisocial and aggressive-sadistic personality disorders (13% each). Each of these disorders was significantly more prevalent in patients with violence problems than those without. The most commonly diagnosed personality disorder in patients without violence was the dependence personality disorder, although this difference was not statically significant.

3.2.4. Maladjustment variables

Comparisons of some of the maladjustment variables are shown in Table 4. As can be seen, the patients with violence problems showed more adjustment difficulties with family (especially parents, brothers and sisters) and social (friends and colleagues) domains.

PLACE TABLE 4HERE

It is important to note that 46% of the patients studied had been victims of different kinds of abuse. This level for the overall sample is worrisome; even so, patients with violence problems were more likely to report any kind of abuse (60.9%) than patients without violence problems (36.4%). Statistically significant differences were found between the groups in the categories of psychological and physical abuses.

4. DISCUSSION

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The results of this study indicate that violent behaviours are quite frequent in addicted patients. According to this study, 39.68% of the sample had experienced problems related to violence control. These problems were closely associated with drug consumption and were mainly directed at family, friends and drug abuse partners or executed to obtain money for buying drugs. These results are consistent with data obtained in the few studies that were carried out to date in this field (Boles & Miotto, 2003; Marshall, et al., 2008; Mericle & Havassy, 2008).

These results are very relevant because interpersonal violence can interfere with therapy progress and with maintaining abstinence from substances (Schneider & Timko, 2009). Encountering interpersonal problems is well-known to predict relapse in addicted patients (Fernández-Montalvo, López-Goñi, Illescas, Landa, & Lorea, 2007; Marlatt & Gordon, 1985). Thus, violent behaviours are an important domain to account for when assessing and treating addicted patients.

Comparisons between addicts with and without associated violence problems showed statistically significant differences in socio-demographic, psychopathological, personality and adjustment variables. According to these results, patients with violence control problems presented with both more severe addictions and with more comorbid problems.

The profile of drug-addicted patients with violence problems as compared to non-violent drug-addicted individuals reflected a younger patient who had experienced risk situations related to drug consumption more frequently (e.g., drug overdose) and who demonstrated a greater need for help in important domains, as assessed by the *EuropAsi*, including legal situation, social relationships, and psychiatric state. Furthermore, the results showed an increased presence of psychopathological

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comorbidity in violent drug-addicted patients, as reflected by *SCL-90-R* and *MCMI-II* scores. It is noteworthy, however, that non-violent patients scored significantly higher on the dependent personality scale. This is consistent with other results, as the presence of violent behaviour is clearly inconsistent with the typical traits of a dependent personality.

Regarding maladjustment variables, patients who were associated with violence showed more maladjustment issues in some family, social and labour variables. Problems in these domains could also interfere seriously with the progress of addiction treatment (Fernández-Montalvo, López-Goñi, Illescas, Landa, & Lorea, 2008; López-Goñi et al., in press).

One surprising and worrisome piece of data obtained in this study is the high rate of patients who had been victims of different kind of abuse (46% of the whole sample), especially for drug-addicted patients who were associated with violent behaviours (more than 60% of this group). Although few studies have examined risk factors for violence among substance users, the prevalence of abuse among this population has been found to be strikingly high in numerous studies, with some studies showing rates above 50% in drug-addicted samples (Chermack, Walton, Fuller, & Blow, 2001; Finlinson et al., 2003; Marshall, et al., 2008). Nonetheless, the rate of abuse found in drug-addicted patients in this research was higher than expected. Additional studies are needed to validate these findings and explore potential explanations for this phenomenon.

Our results suggest that individuals with violence problems showed a more severe profile of addiction. Because of this, some authors have recommended that violent patients with a substance use disorder must be provided with additional, targeted

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intervention to promote violence-free outcomes (Schneider & Timko, 2009). When violent and non-violent patients with a substance use disorder receive comparable treatments, the violent group tends to have poorer substance use related outcomes at follow-ups (Fernández-Montalvo, et al., in press). However, few studies have focused on this aspect, and more research in this area is needed.

The present study has a number of limitations. First, the exploratory and descriptive nature of this study means that the specific causal role that substances play in the perpetration of violence remains unknown. The configuration of the sample itself is another issue that should be taken into account. Because few women were included in the sample, the results obtained can mainly be generalised to male-addicted patients. It is true that almost all studies about drug dependence include largely male samples, but it should nevertheless be taken into account when generalising the obtained results. Third, the assessment of the sample was carried out in three sessions, each of which took place once a week. Hence, the final sample may be biased because all clients had to attend three consecutive measurements during a three-week period. The patients who dropped out before all of the measurements were completed were not included in the study. This methodological problem might influence the findings and must be considered in further research.

In summary, the present study investigated the prevalence rate of violent behaviours in drug-addicted patients as well as the differential profiles of patients with and without violence problems. This study forms part of a wider research base that is focused on understanding factors related to violence and addictions. From a clinical perspective, this is an important goal because violence interferes with the course of the therapeutic evolution of addicted patients.

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<http://dx.doi.org/10.1177/0886260511416475>

6. REFERENCES

- American Psychiatric Association. (2000). *Diagnostic and statistical manual of mental disorders (4th Ed. Rev.)*. Washington, D.C.: APA.
- Bennett, T., & Holloway, K. (2005). The association between multiple drug misuse and crime. *International Journal of Offender Therapy and Comparative Criminology*, 49(1), 63-81.
- Bobes, J., González, M. P., Sáiz, P. A., & Bousoño, M. (1996). *Índice europeo de severidad de la adicción: EuropASI. Versión española*. Paper presented at the Actas de la IV Reunión Interregional de Psiquiatría.
- Boles, S. M., & Miotto, K. (2003). Substance abuse and violence - A review of the literature. *Aggression and Violent Behavior*, 8(2), 155-174.
- Chermack, S. T., Walton, M. A., Fuller, B. E., & Blow, F. C. (2001). Correlates of expressed and received violence across relationship types among men and women substance abusers. *Psychology of Addictive Behaviors*, 15(2), 140-151.
- Clements, K., & Schumacher, J. A. (2010). Perceptual biases in social cognition as potential moderators of the relationship between alcohol and intimate partner violence: A review. *Aggression and Violent Behavior*, 15(5), 357-368.
- Colasanti, A., Natoli, A., Moliterno, D., Rossattini, M., De Gaspari, I. F., & Mauri, M. C. (2008). Psychiatric diagnosis and aggression before acute hospitalisation. *European Psychiatry*, 23(6), 441-448.
- Derogatis, L. R. (1992). *The SCL-90-R*. Baltimore: Clinical Psychometric Research.
- Easton, C. J., Swan, S., & Sinha, R. (2000). Prevalence of family violence entering substance abuse treatment. *Journal of Substance Abuse Treatment*, 18(1), 23-28.
- Fagan, J. (1993). Interactions among drugs, alcohol, and violence. *Health Affairs*, 12(4), 65-79.
- Fals-Stewart, W., Golden, J., & Schumacher, J. A. (2003). Intimate partner violence and substance use: A longitudinal day-to-day examination. *Addictive Behaviors*, 28(9), 1555-1574.
- Fernández-Montalvo, J., & Echeburúa, E. (1997). Variables psicopatológicas y distorsiones cognitivas de los maltratadores en el hogar: un análisis descriptivo. *Análisis y Modificación de Conducta*, 23, 151-180.
- Fernández-Montalvo, J., & Echeburúa, E. (2005). Hombres condenados por violencia grave contra la pareja: un estudio psicopatológico. *Análisis y Modificación de Conducta*, 31(451-475).
- Fernández-Montalvo, J., López-Goñi, J. J., & Arteaga, A. (in press). Tratamiento de agresores contra la pareja en programas de atención a drogodependientes: un reto de futuro. *Adicciones*.
- Fernández-Montalvo, J., López-Goñi, J. J., Illescas, C., Landa, N., & Lorea, I. (2007). Relapse precipitants in addictions: Results in a therapeutic community. *Journal of Addictive Diseases*, 26, 55-61.
- Fernández-Montalvo, J., López-Goñi, J. J., Illescas, C., Landa, N., & Lorea, I. (2008). Evaluation of a therapeutic community treatment program: A long-term follow-up study in Spain. *Substance Use & Misuse*, 43(10), 1362-1377.
- Finlinson, H. A., Oliver-Vélez, D., Deren, S., Cant, J. G. H., Colón, H. M., Robles, R. R., et al. (2003). Puerto Rican drug users' experiences of physical and sexual abuse: Comparison based on sexual identities. *Violence Against Women*, 9(7), 839-858.
- Fernández-Montalvo, J., López-Goñi, J.J. y Arteaga, A. (2012). Violent behaviours in drug addiction: Differential profiles of drug-addicted patients with and without violence problems. *Journal of Interpersonal Violence*, 27(1), 142-157.

- Goldstein, P. (1985). The drugs/violence nexus: A tripartite conceptual framework. *Journal of Drug Issues*, 15(4), 493-506.
- Goldstein, P. (1989). Drugs and violent crime. In N. A. Weiner & M. E. Wolfgang (Eds.), *Pathways to criminal violence* (pp. 16-48). Beverly Hills: SAGE.
- González de Rivera, J. L. (2002). *Versión española del SCL-90-R*. Madrid: TEA.
- Koeter, M. W. J., & Hartgers, C. (1997). *Preliminary procedure for the computation of the Europasi Composite Scores*. Amsterdam: The Amsterdam Institute for Addiction Research.
- Kokkevi, A., & Hartgers, C. (1995). European adaptation of a multidimensional assessment instrument for drug and alcohol dependence. *European Addiction Research*, 1, 208-210.
- López-Goñi, J. J., Fernández-Montalvo, J., Menéndez, J. C., Yudego, F., Rico, A., & Esarte, S. (in press). Employment integration after therapeutic community treatment: a case study from Spain. *International Journal of Social Welfare*.
- Marlatt, G. A., & Gordon, J. R. (1985). *Relapse prevention: Maintenance strategies in the treatment of addictive behaviors*. New York: Guilford Press.
- Marshall, B. D. L., Fairbairn, N., Li, K., Wood, E., & Kerr, T. (2008). Physical violence among a prospective cohort of injection drug users: A gender-focused approach. *Drug and Alcohol Dependence*, 97(3), 237-246.
- Martin, S. E., & Bryant, K. (2001). Gender differences in the association of alcohol intoxication and illicit drug abuse among persons arrested for violent and property offenses. *Journal of Substance Abuse*, 13(4), 563-581.
- McLellan, A. T., Luborsky, L., Woody, G. E., & O'Brien, C. P. (1980). An improved diagnostic evaluation instrument for substance abuse patients: The Addiction Severity Index. *The Journal of Nervous and Mental Disease*(168), 26-33.
- Mericle, A. A., & Havassy, B. E. (2008). Characteristics of recent violence among entrants to acute mental health and substance abuse services. *Annual meeting of the College on Problems of Drug Dependence*, 43(5), 392-402.
- Millon, T. (1997). *Millon Clinical Multiaxial Inventory- II (MCMI II)*. Minneapolis: National Computer Systems.
- Moore, T. M., Stuart, G. L., Meehan, J. C., Rhatigan, D. L., Hellmuth, J. C., & Keen, S. M. (2008). Drug abuse and aggression between intimate partners: A meta-analytic review. *Clinical Psychology Review*, 28(2), 247-274.
- Murphy, C. M., & Ting, L. (2010). The effects of treatment for substance use problems on intimate partner violence: A review of empirical data. *Aggression and Violent Behavior*, 15(5), 325-333.
- O'Farrell, T. J., & Murphy, C. M. (1995). Marital violence before and after alcoholism treatment. *Journal of Consulting and Clinical Psychology*, 63(2), 256-262.
- Santamaría, J. J., & Chait, L. (2004). Drogadicción y delincuencia. Perspectiva desde una prisión. *Adicciones*, 16(3), 207-217.
- Schneider, R., & Timko, C. (2009). Does a history of violence influence treatment, self-help, and 1-year outcomes in substance use disorder patients? *Journal of Addictive Diseases*, 28(2), 171-179.
- Weltzer, S. J. (1990). The Millon Clinical Multiaxial Inventory (MCMI): A review. *Journal of Personality Assessment*, 55, 445-464.

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Table 1. Comparisons in socio-demographic and drug abuse characteristics

	All N= 252		With violence problems (n = 100)		Without violence problems (n = 152)		
	Mean	(SD)	Mean	(SD)	Mean	(SD)	<i>t</i> (df)
Mean age	37.6	(9.5)	35.3	(8.1)	39.0	(10.0)	3.1* (250)
	All (N = 252)		With violence problems (n = 100)		Without violence problems (n = 152)		
	N	(%)	n	(%)	n	(%)	<i>X</i> ² (df)
Sex							
Men	203	(80.6%)	80	(80.0%)	123	(80.9%)	.0 (1)
Women	49	(19.4%)	20	(20.0%)	29	(19.1%)	
Marital Status¹							
Single	122	(48.4%)	56	(56.0%)	66	(43.4%)	4.5 (2)
Married	76	(30.2%)	28	(28.0%)	48	(31.6%)	
Divorced	50	(19.8%)	15	(15.0%)	35	(23.0%)	
Widower	4	(1.6%)	1	(1.0%)	3	(2.0%)	
Education							
None	28	(11.2%)	16	(16.0%)	12	(7.9%)	1.6 (3)
Primary school	135	(53.8%)	53	(53.0%)	82	(54.3%)	
Secondary school	62	(24.7%)	25	(25.0%)	37	(24.5%)	
University	26	(10.4%)	6	(6.0%)	20	(13.2%)	
Employment situation							
Employed	166	(65.9%)	64	(64.0%)	102	(67.1%)	2.1 (2)
Unemployed	68	(27.0%)	31	(31.0%)	37	(24.3%)	
Others (student, retired, etc.)	18	(7.1%)	5	(5.0%)	13	(8.6%)	
Substance that motivated treatment							
Alcohol	109	(43.3%)	43	(43.0%)	66	(43.4%)	2.1 (2)
Cocaine	125	(49.6%)	47	(47.0%)	78	(51.3%)	
Others (heroin, cannabis...)	18	(7.1%)	10	(10.0%)	8	(5.3%)	
Poly-consumption	64	(25.4%)	27	(27.0%)	37	(24.3%)	.2 (1)
Drug overdose	29	(11.5%)	20	(20.0%)	9	(5.9%)	11.7** (1)
Previous treatments for addiction	138	(54.8%)	57	(57%)	81	(53.3%)	.3 (1)

¹In the *X*² analysis of Marital Status, the categories “Divorced” and “Widower” have been joined.

p* < .01; *p* < .001

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Table 2. Comparisons in clinical variables

	All (N = 252)	With violence problems (n = 100)	Without violence problems (n = 152)		
	n (%)	n (%)	n (%)	χ^2	df
Dropouts	98 (38.9%)	39 (39.0%)	59 (38.8%)	.0	1
	<i>M (SD)</i>	<i>M (SD)</i>	<i>M (SD)</i>	<i>t</i>	<i>df</i>
EuropASI					
Medical	.22 (.25)	.22 (.25)	.23 (.33)	.27	250
Economic	.38 (.45)	.41 (.46)	.36 (.44)	.91	250
Job satisfaction	.27 (.32)	.31 (.33)	.24 (.31)	1.7	250
Alcohol	.31 (.24)	.32 (.24)	.31 (.24)	.25	250
Drugs	.13 (.12)	.14 (.12)	.12 (.12)	1.4	250
Legal	.11 (.19)	.16 (.22)	.08 (.16)	3.1**	165.2
Family	.27 (.23)	.30 (.23)	.25 (.23)	1.6	250
Social	.15 (.18)	.20 (.12)	.12 (.16)	3.4**	248
Psychiatric	.21 (.19)	.25 (.18)	.19 (.19)	2.4*	242
SCL-90-R (percentiles)					
GSI	31.9 (25.9)	36.0 (26.7)	29.2 (25.2)	2.1*	250
PSDI	27.8 (23.9)	29.0 (24.8)	27.0 (23.4)	.6	202.7
PST	37.4 (28.5)	42.2 (28.3)	34.3 (28.3)	2.2*	212.3
Somatisation	27.3 (22.6)	26.8 (21.6)	27.7 (23.7)	.3	250
Obsessive-compulsive	36.6 (24.7)	41.2 (25.5)	33.6 (23.8)	2.4*	250
Interpersonal sensitivity	40.1 (27.5)	44.1 (28.4)	37.5 (26.7)	1.9	250
Depression	32.2 (24.9)	36.3 (25.9)	29.5 (24.0)	2.1*	250
Anxiety	28.8 (24.7)	32.4 (25.7)	26.3 (23.8)	1.9	250
Hostility	37.4 (26.3)	42.6 (28.1)	33.9 (24.4)	2.5*	190.9
Phobic anxiety	33.5 (25.5)	36.7 (26.9)	31.4 (24.5)	1.6	250
Paranoid ideation	40.8 (25.7)	44.4 (24.6)	38.3 (26.2)	1.8	250
Psychoticism	39.2 (24.8)	44.9 (24.5)	35.4 (24.3)	3.0**	250
MCMI-II					
Schizoid	58.1 (27.8)	56.2 (24.5)	59.4 (29.9)	.9	250
Phobic	49.3 (27.9)	51.4 (28.6)	48.0 (27.5)	.9	250
Dependence	59.9 (24.2)	55.2 (25.0)	62.9 (23.2)	2.5*	250
Histrionic	54.2 (20.2)	56.8 (20.7)	52.5 (19.7)	1.6	250
Narcissistic	50.7 (23.6)	54.0 (22.8)	48.6 (24.0)	1.8	250
Antisocial	53.2 (23.4)	60.0 (22.5)	48.7 (23.0)	3.8***	250
Aggressive-sadistic	52.5 (22.7)	59.3 (21.8)	48.0 (22.3)	3.9***	250
Compulsive	54.2 (21.0)	51.6 (20.7)	55.9 (21.1)	1.6	250
Passive-aggressive	45.3 (30.5)	55.4 (30.6)	38.6 (28.7)	4.4***	250
Self-destructive	48.0 (24.2)	50.7 (25.4)	46.3 (23.3)	1.4	250
Schizotypal	41.8 (23.3)	44.9 (24.2)	39.7 (22.5)	1.7	250
Borderline	39.5 (25.9)	45.2 (26.0)	35.8 (25.3)	2.9**	250

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Paranoid	56.0 (16.7)	57.6 (15.6)	55.0 (17.3)	1.2	250
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* $p < .05$; ** $p < .01$; *** $p < .001$

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Table 3. Comparison in the rate of personality disorders

MCMI-II	All (N = 252) N (%)	With violence problems (n = 100) n (%)	Without violence problems (n = 152) n (%)	X²
Schizoid	23 (9.1%)	9 (9.0%)	14 (9.2%)	.01
Phobic	19 (7.5%)	8 (8.0%)	11 (7.2%)	.05
Dependence	29 (11.5%)	7 (7.0%)	22 (14.5%)	3.3
Histrionic	7 (2.8%)	4 (4.0%)	3 (2.0%)	.9
Narcissistic	17 (6.7%)	7 (7.0%)	10 (6.6%)	.02
Antisocial	18 (7.1%)	13 (13.0%)	5 (3.3%)	8.6**
Aggressive-sadistic	21 (8.3%)	13 (13.0%)	8 (5.3%)	4.7*
Compulsive	18 (7.1%)	6 (6.0%)	12 (7.9%)	.3
Passive-aggressive	28 (11.1%)	20 (20.0%)	8 (5.3%)	13.3***
Self-destructive	12 (4.8%)	7 (7.0%)	5 (3.3%)	1.8
Schizotypal	6 (2.4%)	4 (4.0%)	2 (1.3%)	1.9
Borderline	6 (2.4%)	4 (4.0%)	2 (1.3%)	1.9
Paranoid	6 (2.4%)	2 (2.0%)	4 (2.6%)	.01
TOTAL¹	118 (46.8%)	53 (53.0%)	65 (42.8%)	2.5

* $p < .05$; ** $p < .01$; *** $p < .001$

¹The total number of people affected by personality disorders is inferior to the total sum of disorders because there are patients who present more than one personality disorder.

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Table 4. Comparison in maladjustment variables

		<i>N</i>	All (<i>N</i> = 252) <i>N</i> (%)	With violence problems (<i>n</i> = 100) <i>n</i> (%)	Without violence problems (<i>n</i> = 152) <i>n</i> (%)	χ^2
Family maladjustment						
Problems with	Mother	249	75 (30.1%)	38 (38.4%)	37 (24.7%)	5.3*
	Father	242	86 (35.7%)	49 (50.5%)	37 (25.7%)	15.6***
	Brothers/Sisters	241	79 (32.8%)	39 (41.1%)	40 (27.4%)	4.9*
	Sexual partner	239	146 (61.1%)	65 (68.4%)	81 (56.3%)	3.6
	Son/Daughters	120	15 (12.5%)	3 (7.1%)	12 (15.4%)	1.7
Social maladjustment						
Problems with	Intimate friends	243	63 (25.9%)	35 (36.5%)	28 (19.0%)	9.2**
	Neighbours	248	31 (12.5%)	17 (17.2%)	14 (9.4%)	3.3
	Work colleagues	249	71 (28.6%)	37 (37.4%)	34 (22.8%)	6.2*
Labour maladjustment						
Without permanent job during the last 3 years		252	18 (15.1%)	17 (17.0%)	21 (13.8%)	.5
Victim of abuse						
		250	115 (46%)	60 (60.9%)	55 (36.4%)	14.1 ***
Type of abuse	Psychological	251	107 (42.6%)	56 (56.0%)	51 (33.8%)	12.1 ***
	Physical	250	45 (18.0%)	26 (26.3%)	19 (12.6%)	7.6**
	Sexual	251	23 (9.2%)	13 (13.0%)	10 (6.6%)	2.9

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